POWERFUL OWLS

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A POWERFUL OWL STORY

The Powerful Owl (Ninox strenua)

Now uncommon in central Victoria, the Powerful Owl is the largest member of the Australian owl family. Like other owls, Powerful Owls are secretive birds and can be difficult to locate as they spend their daylight hours drowsing on a secluded roost in the upper foliage in one of their favourite trees. Local Powerful Owls seem to have a preference for Red Stringybark eucalypts and Black Wattles as roosting locations. When visiting a Powerful Owl territory the sight of creamy white excreta and 'castings' (disgorged pellets containing bones and fur) on the forest floor is a clear indication that owls have been roosting in the branches above.

Two birds of a pair don't consistently roost together but are usually within calling distance. On calm evenings and more particularly in frosty weather, the owls' 'woo-hoo' cries are uttered as daylight fades and just before they abandon their daylight roost. Calls are also made at dawn.

A pair of Powerful Owls will follow a strict routine at breeding time. In mid-to-late autumn the owls normally move to a roosting location that is closer to their chosen nest tree. Here they will roost close together, which is a sign that they are likely to mate. In late May/early June the female enters the nest hollow (known to have an entrance at least half a metre wide and to descend more than a metre down into the tree) and the male normally roosts in a tree nearby. During this time the owls will continue to call to each other and this can often be a sign that the female needs fresh prey. Normally two eggs are laid and incubation takes 38 days. The chicks will emerge from the nest hollow in mid-September - after 9 weeks in the hollow. At this stage the chicks will appear with immature plumage (notably a lack of breast barring and with white feathers on the head), but their eyes will have already developed their mature yellow colour. The chicks will then roost within sight of their parents for a few months, departing after summer in the following year.

Owls are classified as 'raptors' as they hunt by seizing prey in their talons. Raptors are further classified as either 'diurnal' raptors (those that are active and hunt during daylight hours) or 'nocturnal' raptors (those that are active and hunt during the night - i.e. owls). Unlike diurnal raptors where females are normally larger than males, in the case of Powerful Owls the opposite is the case. The female Powerful Owl is a 'slighter' bird than the male and has a narrow, rounded head. The male is a noticeably bigger bird than the female and has a broader, flatter head. Powerful Owls hunt from dusk and into the night hours with a preference for possums as prey. They will also hunt for birds such as Choughs and Currawongs.

Most of the above information comes from the research and publications of pioneer Australian conservationist and zoologist Dr David Fleay. The image to the right shows 'Ferox', David Fleay's first captive Powerful Owl. The image was taken by David in Ballarat, Victoria in 1926.

The rest of this book is devoted to a pictorial record of the actual events in the lives of a young pair of Powerful Owls I observed for over a decade beginning in 2014. For the last 3 years of this project I was fortunate to have invaluable assistance from Blair Venn, Ken Dredge and Liv Windsor. This book would not have been possible without them.

The Powerful Owl Story

The story began when a young female owl (pictured below) arrived in a mature forest in the Bendigo district and settled in a grove of Red Stringybark eucalypts. She remained in this territory for the next couple of years, roosting by day and hunting in the evenings. Her diet consisted of arboreal mammals (Sugar Gliders, Common Ringtails and Common Brushtails) and occasionally birds. She sometimes roosted in various locations adjacent to her Stringybark territory and could often be heard calling in the early mornings, most probably from a desire to attract a mate to the area.

In mid-2016 the female owl finally attracted a mate (pictured right). He was a trim and healthy young bird and was visibly larger than her. He settled in well and the pair could normally be seen roosting in the Stringybark grove, often side by side in the same tree.

The next four years

During the next four years the owls established a predictable daily routine and by the end of 2020 they had matured into fine adult specimens. However up to this point they had shown no inclination towards nesting and producing offspring. During the early months of 2021 the owls were occasionally absent from their territory for short periods, but from March 23rd they began roosting close together in a Stringybark eucalypt not far from a potential nest site in a large dead tree hollow.

2021 - Would the owls breed this year?

For most of May, 2021 the owls seemed to be aware of the potential dead tree nest hollow. For the last part of the month and early in June the pair could regularly be seen observing this hollow. At about this time there was evidence (fur and bone castings and thick creamy excreta on the forest floor) that the owls had obviously been active in the vicinity of the hollow. It seemed likely that the female would soon enter the hollow to begin her nesting routine. The male was now regularly roosting in a 'lookout' position in an adjacent tree. On June 7th the male was roosting 50 metres from the nest hollow with a fresh possum kill.

As expected, on June 9th the female entered the nest hollow, indicating that she was about to lay her first egg. By June 26th the female was still in the nest hollow and the male continued roosting in his 'lookout'. A large quantity of excreta and castings had accumulated below him on the forest floor.

All seemed to be progressing well when on July 1st the remains of what appeared to be a Powerful Owl eggshell were found about 5 metres from the base of the nest tree. This was a bad sign as it was obviously too early for the eggs to have hatched. On July 9th the female owl was roosting alone 30 metres from the nest hollow and by the end of July both owls were regularly roosting 50 metres away. Sadly it was now obvious that the pair had abandoned their nest, possibly because incubation was unsuccessful or perhaps due to their lack of breeding experience.

Images:
Left (top) - the male in his 'lookout' roost.
Left (bottom) - Bone and fur castings.
Right - the nest hollow.
Opposite - The adult male powerful Owl - calm but vigilant

2022 - An eventful year

Over the next six months life seemed to return to normal for the owls. For most of March they roosted within 50 metres of the nest hollow. On March 22nd they were roosting together in the upper branches of a tree quite close to the hollow. As Powerful Owls typically roost close together in the weeks leading up to the female entering the nest hollow this was an encouraging development. On March 29th the owls were sitting side by side high in a Stringybark 40 metres from the nest hollow. This pattern of behaviour continued for the following few weeks. On April 25th, in what was a very promising sign, there was fresh excreta on the forest floor below the male's 2021 'lookout' roost. The owls were regularly roosting together for the rest of April and May. By the end of May, excreta and castings were 'piling up' under the male's lookout.

On June 1st the male was standing guard on his 'lookout' ten metres from the nest hollow. The female was nowhere to be seen, which was a clear sign that she had entered the nest hollow. Assuming that incubation started around the beginning of June, the owlets could be expected to leave the nest hollow by the end of the first week of September. It was now up to nature to take its course.

Until early in August the female remained in the nest hollow and the male continued to stand guard on his lookout roost. It could now be assumed that by this time incubation was complete and that the female was nurturing four-week-old chicks. At this stage both adults were leaving the nest in the evenings for hunting exploits.

The female left the nest hollow mostly unattended during August and would only return to feed the owlets - firstly by jumping down into the hollow, then by dropping food from the main entrance to the hollow and then in the last two weeks before fledging the owlets would climb to the entrance to be fed. The male was often at the hollow entrance looking in. By August 25th prey was being brought in regularly. The male was now on a lower nearby roost, waggling his head and performing other antics in what seemed to be an attempt to encourage the owlets out of the nest hollow. On the following day two owlets appeared in the main entrance to the hollow, looking out on the big wide world. They were now 7 weeks old and ready for action.

On August 29th the owlets were poking their heads out of the nest hollow late in the afternoon. They were a sight to behold, with mostly white plumage but with dark colouring around their eyes and faint dark stripes on their crowns. Their eyes had already developed their mature yellow colour. At dusk two days later I was able to capture some very memorable images of the owlets, as shown to the right.

Flying Free

As expected, at around 6.30pm on September 3rd one of the owlets left the nest hollow and began roosting with the adults in their Stringybark grove territory. As it left the hollow on its maiden flight and crashed into nearby branches it was keenly observed by its sibling, who left the hollow during the next evening. At this stage the youngsters were around eight-an-a-half weeks old. Being totally dependent on their parents, from the time that the owlets fledged (left the nest hollow) they were never far from the adult birds. It wasn't uncommon to see the whole family roosting in a single tree - always a Stringybark. It now became important to capture images of these beautiful young owls, to build a chronicle of their physical development from the moment they took their first flight. As the owlets developed, so did their inquisitive personalities, making them perfect photographic subjects. Their parents were not as easy to photograph, often hidden amongst the tree canopy, drifting in and out of sleep.

The image below shows one of the owlets on September 7th (at 9 weeks of age) - gender unknown, as it is difficult to determine gender until the owlets achieve adulthood.

On September 10th the adult female was concealed in a small Grey Box eucalypt just past the south end of the owls' normal range. The adult male and the owlets were nowhere to be found - this situation continued until September 19th. This was not unusual behaviour as adult Powerful Owls are known to roost in a variety of locations, often close to where they made their evening's kill. The owlets were possibly following the adult male around in the expectation of being fed, as they were totally dependent at this stage of their lives. By September 20th the owlets were back and appeared to be healthy and well fed.

The image below shows one of the owlets on September 22nd - now 11 weeks old.

October 15th - This owlet was very alert as it roosted amongst thick foliage - now 13 weeks old.

October 10 - Late afternoon. The adult male was roosting half-asleep in the upper canopy of a large Stringybark. He was clutching a Brushtail and he presented a dramatic image in the fading evening light. It would have required considerable strength for the owl to capture and transport this large animal.

October 19 - Mid-morning. The owlets were roosting in an open position with the morning sun in front of them. They had their backs facing the camera, revealing that their wi
and tail plumage had become more fully developed. They were now 15 weeks old and beginning to look more like the adults.

October 26th - Late afternoon. As can be seen in the image below, at 16 weeks of age the owlets appear alert and focussed.

October 27th - during this intense phase of his child-rearing responsibilities, the adult male takes a break in a quiet 'hideaway'.

November 3rd - adult female with Brushtail.

November 21st. Owlet, now 19 weeks old. Its breast barring was becoming more prominent and it was developing more dark colouring on its crown.

December 2nd. Owlet, 21 weeks old, drowsing in a secluded location. Like other young raptors at this stage of their physical development, the owlets begin to look rather 'untidy', but it won't be long before they develop their adult plumage. When that happens they become quite striking in appearance.

December 13th. The whole owl family was roosting in a tall Stringybark. This image shows one of the owlets at 23 weeks with its plumage still in transition. It looked very majestic as it turned its beautiful yellow eyes towards the camera.

December 21st. The owlet shown above was 24 weeks old. Its breast barring was now almost complete and it was developing more dark plumage on its crown.

2023

On January 4th the owlets were six months old. The changes in their physical appearance over the previous few weeks were very noticeable - their crowns were now almost fully feathered. With their talons so well developed the owlets now had the ability to capture prey for themselves.

January 16th. Roosting together and close to the adult male, the owlets were now aged 28 weeks and were looking much more like their parents.

January 26th - the beautiful adult female roosting peacefully in the soft early morning light. This picturesque spot was one of her favourite roosting locations.

At 9am on February 14th the owlets were roosting very close to one another amongst thick foliage. From recent observations it appeared that they were now hunting successfully and had therefore achieved some degree of independence. At 32 weeks the owlets were now very attractive birds.

ADDENDUM

As first time parents in 2022 the owls had followed their instincts and performed their duties with distinction.

Early in March, 2023 the owlets finally left their parents' territory. A few weeks later the adults were showing clear signs that they were preparing for another nesting attempt.
As the weeks passed the owls settled into their instinctive nesting routine, with dates of key stages corresponding closely to those of their 2022 nesting season.

Once the adult female entered the nest hollow the male maintained a vigil on his 'lookout' roost, where he remained throughout the females confinement in the hollow. He left his roost to hunt, supplying prey regularly to the female. Not long after her eggs hatched she regularly joined him in his hunting exploits, as she did in 2022.

By the end of the first week of September the older owlet was regularly seen sitting in the main entrance to the nest hollow (see image to the right). On September 13th the owlet was observed perched on top of the hollow. Sometime after dusk it made its maiden flight to join its mother in the upper leafy branches of a large Stringybark eucalypt.
The younger owlet left the nest hollow on September 16th and by the 18th both adults and the owlets were observed roosting together.

In his book *Nightwatchmen of Bush and Plain,* David Fleay remarked *"It is said that the pairing of Powerful Owls is far from a casual affair and that not just any male and female become attached to each other".* It's therefore quite remarkable that the principal characters in this story found each other in the first place and that they went on to breed successfully. Nature is full of beauty and mystery.